

PATENT COOPERATION TREATY

PCT

NOTIFICATION OF ELECTION

(PCT Rule 61.2)

From the INTERNATIONAL BUREAU

To:

Assistant Commissioner for Patents
United States Patent and Trademark
Office
Box PCT
Washington, D.C.20231
ETATS-UNIS D'AMERIQUE

in its capacity as elected Office

Date of mailing (day/month/year) 04 October 2000 (04.10.00)	
International application No. PCT/US00/03943	Applicant's or agent's file reference 7427M/MH
International filing date (day/month/year) 16 February 2000 (16.02.00)	Priority date (day/month/year) 19 February 1999 (19.02.99)
Applicant ZHANG, Shulin et al	

1. The designated Office is hereby notified of its election made:



in the demand filed with the International Preliminary Examining Authority on:

17 July 2000 (17.07.00)



in a notice effecting later election filed with the International Bureau on:

2. The election ☒ was

was not

made before the expiration of 19 months from the priority date or, where Rule 32 applies, within the time limit under Rule 32.2(b).

The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland Facsimile No.: (41-22) 740.14.35	Authorized officer Fascal Piriou Telephone No.: (41-22) 338.83.38
---	---

PATENT COOPERATION TREATY

PCT

INTERNATIONAL SEARCH REPORT

(PCT Article 18 and Rules 43 and 44)

Applicant's or agent's file reference 7427M/MH	FOR FURTHER ACTION see Notification of Transmittal of International Search Report (Form PCT/ISA/220) as well as, where applicable, item 5 below.	
International application No. PCT/US 00/ 03943	International filing date (day/month/year) 16/02/2000	(Earliest) Priority Date (day/month/year) 19/02/1999
Applicant THE PROCTER & GAMBLE COMPANY		

This International Search Report has been prepared by this International Searching Authority and is transmitted to the applicant according to Article 18. A copy is being transmitted to the International Bureau.

This International Search Report consists of a total of 2 sheets.

☒ It is also accompanied by a copy of each prior art document cited in this report.

1. Basis of the report

a. With regard to the **language**, the international search was carried out on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.

☐ the international search was carried out on the basis of a translation of the international application furnished to this Authority (Rule 23.1(b)).

b. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international search was carried out on the basis of the sequence listing :

☐ contained in the international application in written form.

☐ filed together with the international application in computer readable form.

☐ furnished subsequently to this Authority in written form.

☐ furnished subsequently to this Authority in computer readable form.

☐ the statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.

☐ the statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished

2. ☐ **Certain claims were found unsearchable** (See Box I).

3. ☐ **Unity of invention is lacking** (see Box II).

4. With regard to the **title**,

☒ the text is approved as submitted by the applicant.

☐ the text has been established by this Authority to read as follows:

5. With regard to the **abstract**,

☒ the text is approved as submitted by the applicant.

☐ the text has been established, according to Rule 38.2(b), by this Authority as it appears in Box III. The applicant may, within one month from the date of mailing of this international search report, submit comments to this Authority.

6. The figure of the **drawings** to be published with the abstract is Figure No.

☐ as suggested by the applicant.

☐ because the applicant failed to suggest a figure.

☐ because this figure better characterizes the invention.

--
☐ None of the figures.

INTERNATIONAL SEARCH REPORT

International Application No

PCT/US 00/03943

A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 C11D3/37 C11D3/00 C11D1/62 C11D3/43

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 C11D

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	WO 99 07813 A (BOECKH DIETER ; MOHR BERNHARD (DE); NORENBERG RALF (DE); GOSSELINK) 18 February 1999 (1999-02-18) page 20, line 581 - line 590; claims 1,5-10; examples I-VI; table IX page 6, line 151 - line 163 ---	1-5, 10
A	US 5 460 736 A (TRINH TOAN ET AL) 24 October 1995 (1995-10-24) column 6, line 22 - line 54; claim 1; example IV ---	1, 13
E	WO 00 22077 A (GOSSELINK EUGENE PAUL ; PANANDIKER RAJAN KESHAV (US); RANDALL SHERR) 20 April 2000 (2000-04-20) examples VII, VIII; tables III, VIIB, VIII examples #10-12 of table III claim 9 -----	1, 3, 4, 10-19

☐ Further documents are listed in the continuation of box C.☒ Patent family members are listed in annex.

* Special categories of cited documents :

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier document but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.

"&" document member of the same patent family

Date of the actual completion of the international search

14 June 2000

Date of mailing of the international search report

26/06/2000

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax: (+31-70) 340-3016

Authorized officer

Loiselet-Taisne, S

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/US 00/03943

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
WO 9907813	A	18-02-1999	AU 8900898 A	01-03-1999
			AU 8901798 A	01-03-1999
			WO 9907814 A	18-02-1999

US 5460736	A	24-10-1995	AU 3216995 A	02-05-1996
			BR 9509285 A	18-11-1997
			CN 1168689 A	24-12-1997
			CZ 9701033 A	17-09-1997
			EP 0785977 A	30-07-1997
			JP 2989012 B	13-12-1999
			JP 10506966 T	07-07-1998
			WO 9611248 A	18-04-1996

WO 0022077	A	20-04-2000	WO 0022078 A	20-04-2000
			WO 0022075 A	20-04-2000
			WO 0022079 A	20-04-2000

INTERNATIONAL SEARCH REPORT

International Application No

PL./GB 99/01850

A. CLASSIFICATION OF SUBJECT MATTER

IPC 6 C07D471/18 C11D3/39 //(C07D471/18,257:00,221:00,221:00)

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 6 C07D C11D

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	WO 96 06154 A (UNILEVER NV ;UNILEVER PLC (GB)) 29 February 1996 (1996-02-29) the whole document ---	1-16
A	WO 94 26276 A (DOW CHEMICAL CO) 24 November 1994 (1994-11-24) the whole document ---	1-3
A	WO 98 10286 A (COOK PHILLIP DAN ;ISIS PHARMACEUTICALS INC (US)) 12 March 1998 (1998-03-12) claims; figures -----	1-3

☐ Further documents are listed in the continuation of box C.



Patent family members are listed in annex.

* Special categories of cited documents :

"A" document defining the general state of the art which is not considered to be of particular relevance

"E" earlier document but published on or after the international filing date

"L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)

"O" document referring to an oral disclosure, use, exhibition or other means

"P" document published prior to the international filing date but later than the priority date claimed

"T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

"X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

"Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.

"&" document member of the same patent family

Date of the actual completion of the international search

3 September 1999

Date of mailing of the international search report

20/09/1999

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2
NL - 2280 HV Rijswijk
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,
Fax: (+31-70) 340-3016

Authorized officer

Chouly, J

INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PL/GB 99/01850

Patent document cited in search report		Publication date	Patent family member(s)		Publication date
WO 9606154	A	29-02-1996	AU	3077495 A	14-03-1996
WO 9426276	A	24-11-1994	US	5385893 A	31-01-1995
			AU	687400 B	26-02-1998
			AU	6784994 A	12-12-1994
			BG	100194 A	31-12-1996
			CN	1125906 A	03-07-1996
			EP	0697872 A	28-02-1996
			FI	955336 A	22-12-1995
			HU	72649 A	28-05-1996
			JP	8511003 T	19-11-1996
			LV	11429 A	20-08-1996
			LV	11429 B	20-04-1997
			NO	954441 A	05-01-1996
			PL	311649 A	04-03-1996
			SG	46496 A	20-02-1998
WO 9810286	A	12-03-1998	AU	4248097 A	26-03-1998

FOR THE PURPOSES OF INFORMATION ONLY

Codes used to identify States party to the PCT on the front pages of pamphlets publishing international applications under the PCT.

AL	Albania	ES	Spain	LS	Lesotho	SI	Slovenia
AM	Armenia	FI	Finland	LT	Lithuania	SK	Slovakia
AT	Austria	FR	France	LU	Luxembourg	SN	Senegal
AU	Australia	GA	Gabon	LV	Latvia	SZ	Swaziland
AZ	Azerbaijan	GB	United Kingdom	MC	Monaco	TD	Chad
BA	Bosnia and Herzegovina	GE	Georgia	MD	Republic of Moldova	TG	Togo
BB	Barbados	GH	Ghana	MG	Madagascar	TJ	Tajikistan
BE	Belgium	GN	Guinea	MK	The former Yugoslav Republic of Macedonia	TM	Turkmenistan
BF	Burkina Faso	GR	Greece	ML	Mali	TR	Turkey
BG	Bulgaria	HU	Hungary	MN	Mongolia	TT	Trinidad and Tobago
BJ	Benin	IE	Ireland	MR	Mauritania	UA	Ukraine
BR	Brazil	IL	Israel	MW	Malawi	UG	Uganda
BY	Belarus	IS	Iceland	MX	Mexico	US	United States of America
CA	Canada	IT	Italy	NE	Niger	UZ	Uzbekistan
CF	Central African Republic	JP	Japan	NL	Netherlands	VN	Viet Nam
CG	Congo	KE	Kenya	NO	Norway	YU	Yugoslavia
CH	Switzerland	KG	Kyrgyzstan	NZ	New Zealand	ZW	Zimbabwe
CI	Côte d'Ivoire	KP	Democratic People's Republic of Korea	PL	Poland		
CM	Cameroon	KR	Republic of Korea	PT	Portugal		
CN	China	KZ	Kazakstan	RO	Romania		
CU	Cuba	LC	Saint Lucia	RU	Russian Federation		
CZ	Czech Republic	LI	Liechtenstein	SD	Sudan		
DE	Germany	LK	Sri Lanka	SE	Sweden		
DK	Denmark	LR	Liberia	SG	Singapore		
EE	Estonia						

REC'D 12 FEB 2001

WIPO

PCT

PCT

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

(PCT Article 36 and Rule 70)

Applicant's or agent's file reference 7427M/MH	FOR FURTHER ACTION See Notification of Transmittal of International Preliminary Examination Report (Form PCT/IPEA/416)	
International application No. PCT/US00/03943	International filing date (day/month/year) 16/02/2000	Priority date (day/month/year) 19/02/1999
International Patent Classification (IPC) or national classification and IPC C11D3/37		
Applicant THE PROCTER & GAMBLE COMPANY et al.		

1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is transmitted to the applicant according to Article 36.



2. This REPORT consists of a total of 9 sheets, including this cover sheet.

- ☐ This report is also accompanied by ANNEXES, i.e. sheets of the description, claims and/or drawings which have been amended and are the basis for this report and/or sheets containing rectifications made before this Authority (see Rule 70.16 and Section 607 of the Administrative Instructions under the PCT).

These annexes consist of a total of sheets.

3. This report contains indications relating to the following items:

- I ☒ Basis of the report
- II ☒ Priority
- III ☐ Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- IV ☒ Lack of unity of invention
- V ☒ Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- VI ☐ Certain documents cited
- VII ☒ Certain defects in the international application
- VIII ☒ Certain observations on the international application

Date of submission of the demand 17/07/2000	Date of completion of this report 08.02.2001
Name and mailing address of the international preliminary examining authority:  European Patent Office D-80298 Munich Tel. +49 89 2399 - 0 Tx: 523656 epmu d Fax: +49 89 2399 - 4465	Authorized officer Ruckebusch, V Telephone No. +49 89 2399 8493 

**INTERNATIONAL PRELIMINARY
EXAMINATION REPORT**

International application No. PCT/US00/03943

I. Basis of the report

1. This report has been drawn on the basis of *(substitute sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this report as "originally filed" and are not annexed to the report since they do not contain amendments (Rules 70.16 and 70.17).):*

Description, pages:

1-64 as originally filed

Claims, No.:

1-19 as originally filed

2. With regard to the **language**, all the elements marked above were available or furnished to this Authority in the language in which the international application was filed, unless otherwise indicated under this item.

These elements were available or furnished to this Authority in the following language: , which is:

- ☐ the language of a translation furnished for the purposes of the international search (under Rule 23.1(b)).
☐ the language of publication of the international application (under Rule 48.3(b)).
☐ the language of a translation furnished for the purposes of international preliminary examination (under Rule 55.2 and/or 55.3).

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international preliminary examination was carried out on the basis of the sequence listing:

- ☐ contained in the international application in written form.
☐ filed together with the international application in computer readable form.
☐ furnished subsequently to this Authority in written form.
☐ furnished subsequently to this Authority in computer readable form.
☐ The statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.
☐ The statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

4. The amendments have resulted in the cancellation of:

- ☐ the description, pages:
☐ the claims, Nos.:
☐ the drawings, sheets:

5. ☐ This report has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed (Rule 70.2(c)):

INTERNATIONAL PRELIMINARY EXAMINATION REPORT

International application No. PCT/US00/03943

(Any replacement sheet containing such amendments must be referred to under item 1 and annexed to this report.)

6. Additional observations, if necessary:

II. Priority

1. ☐ This report has been established as if no priority had been claimed due to the failure to furnish within the prescribed time limit the requested:
- ☐ copy of the earlier application whose priority has been claimed.
 - ☐ translation of the earlier application whose priority has been claimed.
2. ☒ This report has been established as if no priority had been claimed due to the fact that the priority claim has been found invalid.

Thus for the purposes of this report, the international filing date indicated above is considered to be the relevant date.

3. Additional observations, if necessary:
see separate sheet

IV. Lack of unity of invention

1. In response to the invitation to restrict or pay additional fees the applicant has:
- ☐ restricted the claims.
 - ☐ paid additional fees.
 - ☐ paid additional fees under protest.
 - ☒ neither restricted nor paid additional fees.
2. ☐ This Authority found that the requirement of unity of invention is not complied and chose, according to Rule 68.1, not to invite the applicant to restrict or pay additional fees.
3. This Authority considers that the requirement of unity of invention in accordance with Rules 13.1, 13.2 and 13.3 is
- ☐ complied with.
 - ☒ not complied with for the following reasons:
see separate sheet
4. Consequently, the following parts of the international application were the subject of international preliminary examination in establishing this report:

**INTERNATIONAL PRELIMINARY
EXAMINATION REPORT**

International application No. PCT/US00/03943

☒ all parts.

☐ the parts relating to claims Nos. .

**V. Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability;
citations and explanations supporting such statement**

1. Statement

Novelty (N)	Yes: Claims
	No: Claims 1-19
Inventive step (IS)	Yes: Claims
	No: Claims 1-19
Industrial applicability (IA)	Yes: Claims 1-19
	No: Claims

**2. Citations and explanations
see separate sheet**

VII. Certain defects in the international application

The following defects in the form or contents of the international application have been noted:
see separate sheet

VIII. Certain observations on the international application

The following observations on the clarity of the claims, description, and drawings or on the question whether the claims are fully supported by the description, are made:
see separate sheet

**INTERNATIONAL PRELIMINARY
EXAMINATION REPORT - SEPARATE SHEET**

International application No. PCT/US00/03943

1. Reference is made to the following document from the search report:

D1: WO 99 07813 A (BOECKH DIETER ; MOHR BERNHARD (DE); NORENBERG RALF (DE); GOSSELINK) 18 February 1999

- 1.1 The following documents D2 and D8 were not cited in the international search report; copies of the documents are appended hereto:

D2: WO 98 29530 A (RANDALL SHERRI LYNN ; PANANDIKER RAJAN KEESHAV (US); PROCTER & GAMB) 9 July 1998

D3: DE 196 43 133 A (BASF AG) 23 April 1998

D4: EP-A-0 158 260 (HENKEL KGAA) 16 October 1985

D5: FR 2 117 779 A (SOCIETE RHONE-PROGIL)

D6: EP-A-0 978 556 (PROCTER & GAMBLE) 9 February 2000

D7: DE 1 922 450 A (HENKEL & CIE GMBH) 5 November 1970

D8: US-A-3 320 215 (JOHN S. CONTE ET AL) 16 May 1967

Re Item II

Priority

2. D8, published 09.02.2000 and filed 03.08.98 belongs to the same applicant. Since this P-document is novelty destroying (see Re Item V, Paragraph 4.48), and yet comes from the same applicant, the priority of the present application is not valid and thus D8 belongs to the state of the art, and will be considered as the first application for priority purposes (see PCT Guidelines, V-1.4).

Re Item IV

Lack of unity of invention

3. The separate groups of invention are all fabric enhancement composition comprising:

- 1- homo-condensates and a fabric softening active;
- 2- co-condensates and a fabric softening active;
- 3- co-polymers of c) and a fabric softening active;
- 4- co-polymers of d) and a fabric softening active;
- 5- cross-linked basic amino acid-containing polymers of e) and a fabric softening active;
- 6- co-condensates of f) and a fabric softening active.

3.1 They are not so linked as to form a single general inventive concept (Rule 13.1 PCT), because the present application relates to six compositions comprising polymers, which is a), b), c), d), e) or f) and a fabric softening active. Those compositions are already partially disclosed in different documents of the state of the art for the same purpose.

Re Item V

Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step.

4. ***Novelty (Article 33(2) PCT)***

4.1 D1 (page 2, line 40 at the end of page 3, page 6, line 152 to 163, examples and claims) discloses a detergent composition comprising from 1% to 80% by weight of surfactants and from 0.1% to 10% by weight of a mixture of amino acid based polymers, oligomers and copolymers. The formula of said amino acid based polymers in D1, on page 2 encompasses the preferred embodiments of amino acid based polymers of the present application (for example: $R_1=H$, $R_2=-NH_2$, $R_3=-OH$, and $y=3$ for the lysine or 4 for the ornithine).

- 4.2** Moreover the fabric softening active of the present application as described in the description could be also used as nonionic (formula, page 39, line 6 of the present application) or cationic (formula on page 39, line 9 of the present application) surfactant in any detergent composition as disclosed in D1 (claims).
- 4.3** D1 would therefore appear to detract from the novelty of composition claims 1 to 19 according to the requirements of Article 33(2) PCT.
- 4.4** All of D2 to D7 describe composition containing polymeric materials satisfying present claim 1.
- 4.41** D1 discloses (cf. page 5 to page 7, examples and claims) detergent compositions and fabric laundering and treating methods which utilise polyamide-polyamines as fabric treatment agents to impart appearance benefits to fabrics and textiles. Preferred polyamide-polyamines fabric treatment agents are adipic acid-diethylenetriamine-epichlorohydrin adducts.
- 4.42** D2 discloses (cf. claims) a detergent or cleaner comprising (i) a cross-linked nitrogenous compound which is obtainable by cross-linking of a compound containing at least three NH-groups (selected from the group of consisting of polyamines, polyalkylenepolyamines, polyamidoamines) and at least bifunctional crosslinker which reacts with NH-groups and (ii) at least one surfactant.
- 4.43** D3 discloses (cf. page 2, line 23 to page 4, line 28 and claims) a detergent for coloured fabrics containing acyl cyanamide salts, synthetic nonionic surfactants, water soluble organic polymers in the form of compounds of monomers containing more than one amino group (i.e. polyethyleneimines, polypropyleneimines or polyamines) or reaction products thereof with dicarboxylic acid and other standard detergent ingredients.
- 4.44** D4 discloses the whole document) a water-soluble nylon-type resin and the method of preparing it, comprising (a) an amino-carboxylic acid and /or lactams, (b) dibasic acids, esters or anhydrides, or mixtures thereof, (c) polyalkylene polyamines, and (d) crosslinking agents.

4.45 D5 describes (cf. claims 1 to 12) a washing and cleaning composition consisting essentially of (i) a surface-active detergent composition, (ii) a water-soluble or water-dispersible polyamide reaction product of a polyalkyleneimine and an organic polycarboxylic acid having from 2 to 10 carbon atoms, and (iii) a non-surface-active builder salt.

4.46 D6 relates (cf. page 2, line 2 to page 3, line 15 and claims 1 to 7) to a method of washing textile articles with an organic solvent, improved by adding an intensifier, which is a primary or secondary amide derived from a carboxylic aliphatic acid or anhydride, bearing an alkyl or alkenyl substituent and an aliphatic polyamine (i.e. alkylene polyamines).

4.47 D1 to D7 would therefore all appear to detract from the novelty of claims 1, 18 and 19 according to the requirements of Article 33(2) PCT.

4.48 However, D8, published 09.02.2000 and filed 03.08.98 describes (cf. page 3, line 46 to page 4, line 53, examples A and B, and Claims) a composition and a method for treating fabrics in order to improve wrinkle resistance by means of a cross-linking resin having cationic properties. Preferred cross-linking resin are the polymeric amine-epichlorohydrins, in which polymeric amines comprise a polyamide, polyalkylene polyamine or an amine polymer. Document D8, belonging to the same applicant was published between the priority date and the filing date of the present application.

Since this P-document is novelty destroying, and yet comes from the same applicant, the priority of the present application is not valid and thus D8 belongs to the state of the art, and will be considered as the first application for priority purposes (see PCT Guidelines, V-1.4).

5. *Inventive step (Article 33(3) PCT)*

5.1 When the claims are novel, the closest state of the art would appear to be document D1, which, like the present application is concerned with laundry detergent compositions containing amino based polymers to provide fabric appearance benefits. In order to establish an inventive step, the applicant should show any beneficial effects.

**INTERNATIONAL PRELIMINARY
EXAMINATION REPORT - SEPARATE SHEET**

International application No. PCT/US00/03943

- 5.2 Dependent claims 2 to 17 and independant claims 18 and 19 do not contain any features which, in combination with the features of claim 1, meet the requirements of the PCT in respect of novelty and/or inventive step.

Re Item VII

Certain defects in the international application

6. Document D1 as closest state of the art is not acknowledged in the opening paragraphs of the description according to Rule 5.1(a)(ii) PCT.

Re Item VIII

Certain observations on the international application

7. Claims 18 and 19 comprise all the features of claim 1 and is therefore not appropriately formulated as a claim dependent on the latter (Rule 6.4 PCT).
8. Independent claim 1 is not in the two-part form in accordance with Rule 6.3(b) PCT, which in the present case would be appropriate, with those features known in combination from the prior art (document D1) being placed in the preamble (Rule 6.3(b)(i) PCT) and with the remaining features being included in the characterising part (Rule 6.3(b)(ii) PCT).